

Application No.: 10/719959

Case No.: 59010US002

REMARKS

Page 2 has been amended to correct clerical error, and the definitions of "compliant face contacting member" and "facepiece insert" have been amended to refine their meanings.

Claim 1 has been rejected under 35 USC § 102(e) as being anticipated by U.S. Patent 6,701,925 to Resnick. Applicants respectfully submit that this rejection cannot be sustained because Resnick does not disclose a mask that has a supporting portion of a facepiece insert. In fact, Resnick does not disclose a facepiece insert. Resnick describes a protective hood respirator that has a half-mask cup 40 inside the hood 20. The cup is mechanically, but not fluidically coupled, to the filters 50A-B. Resnick's cup 40 is illustrated as a "one-piece cup that does not have a facepiece insert." Because it has a one-piece construction, it is probably made from thick rubber throughout essentially the whole mask body. Please see the first paragraph in the background section of the present specification:

Many respirators that are sold today use a thin rigid structural part for attaching filter elements and valves to the mask body. These rigid structural parts are commonly produced through injection molding and are often referred to as a "nosepiece" or "rigid insert". A soft compliant material, which conforms to a person's face, is disposed on or about the rigid structural insert to enable the mask to fit snugly over the wearer's nose and mouth. The use of a rigid insert in conjunction with a soft compliant portion tends to make the mask lighter and more comfortable to wear, particularly when compared to previous masks that had used thick rubber throughout essentially the whole mask body to support the filter cartridges and valves. Examples of masks that use a rigid insert in conjunction with a compliant face-contacting member are shown in U.S. Patent 6,016,804 to Gleason et al., U.S. Patent 5,592,937 to Freund, and U.S. Patent 5,062,421 to Burns et al.

Because applicants' invention is directed to the use of a rigid insert — which in conjunction with a compliant face contacting member would form a mask body — and Resnick only describes a one-piece mask, Resnick does not disclose applicants' invention so as to be anticipated under 35 USC § 102.

Claims 3, 4, 16, 21, 22, and 23 have been rejected under 35 USC § 103 as being unpatentable over Resnick in view of U.S. Patent 5,505,197 to Scholey. Applicants respectfully submit that this rejection cannot be sustained.

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As indicated above, Resnick does not teach or suggest making the mask that has a rigid facepiece insert. Scholey adds little or nothing to what is lacking in Resnick. Scholey describes "a mask body 12 [that] is a unitary molded member...."¹ Scholey does, however, indicate that the mask body could be manufactured in different pieces and assembled together to form a unitary member at column 3, lines 20-22. But this disclosure, does not suggest providing a fluid communication component that is non-integrally joined to the supporting portion of a facepiece insert. Masks that have been made from separate pieces, subsequently assembled together, have been known for years. Please see the first paragraph in applicants' specification, reproduced above.

In the present invention, the fluid communication components — which commonly are critical tolerance components because they include more complicated and intricate filter attachment mounts and valve seats — are provided in a first step, and, in another step, a supporting portion of a facepiece insert is joined to the fluid communication component. The facepiece insert and its fluid communication components may be made using, for example, injection molding procedures that are carried out as separate operations. The multi-stage operation may address the tolerance mismatch between the insert components. Because the supporting part(s) and the fluid communication part(s) of the insert are separately provided, the inventive method can also support a beneficial distributed manufacturing scheme where fluid communication components can be produced in one location, with the associated expertise and equipment, and the final insert assembly can be carried out in a second location, where the expertise and associated equipment are lacking. And if a change to the fluid communication component is needed, for example, to allow for a different type of filter attachment, the whole facepiece insert does not need to be reconfigured in the mold. A separate mold need only be provided for the fluid communication component of the facepiece insert.

¹ See Scholey at column 3, line 16.

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Resnick and Scholey fail to teach or suggest the basic features of applicants' invention or the benefits that are provided by those features. As such, Resnick and Scholey would not have rendered applicants' invention obvious to a person of ordinary skill, whether taken alone or in combination. Accordingly, the rejection under 35 USC § 103 should be withdrawn.

Respectfully submitted,

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